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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/015,627	12/17/2001	Sadayoshi Kanemaru	217494US8	7547
22850	7590	10/01/2004	EXAMINER	
OBLON, SPIVAK, MCCLELLAND, MAIER & NEUSTADT, P.C. 1940 DUKE STREET ALEXANDRIA, VA 22314			NGUYEN, TUAN N	
			ART UNIT	PAPER NUMBER
			2828	

DATE MAILED: 10/01/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

<b>Office Action Summary</b>	<b>Application No.</b>	<b>Applicant(s)</b>	
	10/015,627	KANEMARU ET AL.	
	<b>Examiner</b>	<b>Art Unit</b>	
	Tuan N Nguyen	2828	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

#### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

#### Status

- 1) ☒ Responsive to communication(s) filed on 17 December 2001.
- 2a) ☐ This action is **FINAL**.                      2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

#### Disposition of Claims

- 4) ☒ Claim(s) 1-25 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-3 and 5-25 is/are rejected.
- 7) ☒ Claim(s) 4 is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

#### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

#### Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All    b) ☐ Some \*    c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.

#### Attachment(s)

- |  |   |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)  | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)   | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)             |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)<br>Paper No(s)/Mail Date <u>4/3/02; 8/19/02</u> . | 6) <input type="checkbox"/> Other: _____  |

## **DETAILED ACTION**

### ***Double Patenting***

1. Claims 1-25 are provisionally rejected under the judicially created doctrine of double patenting over claims 1-67 of patent US 6765935, and claims 1-35 of patent US 6782028. A rejection based on double patenting of the "same invention" type finds its support in the language of 35 U.S.C. 101 which states that "whoever invents or discovers any new and useful process ... may obtain a patent therefore ..." (Emphasis added). Thus, the term "same invention," in this context, means an invention drawn to identical subject matter. See *Miller v. Eagle Mfg. Co.*, 151 U.S. 186 (1894); *In re Ockert*, 245 F.2d 467, 114 USPQ 330 (CCPA 1957); and *In re Vogel*, 422 F.2d 438, 164 USPQ 619 (CCPA 1970).

### ***Claim Rejections - 35 USC § 102***

2. The following is a quotation of 35 U.S.C. 102(6) which forms the basis for all obviousness rejections set forth in this Office action:

(e) the invention was described in a patent granted on an application for patent by another filed in the United States before the invention thereof by the applicant for patent, or on an international application by another who has fulfilled the requirements of paragraphs (1), (2), and (4) of section 371(c) of this title before the invention thereof by the applicant for patent.

3. Claims 1-3, 6-8, 14-15, 17, 20, 25 are rejected under 35 U.S.C. 102(E) as being unpatentable over Ziari et al. (US 6404542).

With respect to claims 1, 2, 3, 6, 20, 25 Ziari et al. '542 shows in (figures 1, 5) and discloses a semiconductor laser having a parallel first and second strip emits first and second laser beams where they separate between 10-100um, or 5um or more (Col 3: 10-20); a laser module with the dual laser, a first lens, a polarization unit, a polarization combining unit comprising first/second/and third port output of the multiplexed beam, and an optical fiber with

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grating receiving laser beam and sends the beams to the outside. Since claim 20 recites the same or identical elements/limitations it is inherent to use patents ('542) to recite the fabrication method of the semiconductor laser module, product by process.

With respect to claims 7, 8 14, 15, 17 Ziari '542 shows the first lens and birefringent element where beams are propagate as ordinary and extraordinary ray (Fig 5: 506, 508) (Col 3: 45-67; Col 5: 45-67); and the second lens disposed between polarization unit and optical fiber grating such that the beams focus on focal points of the lens (Fig 5: 506, 518)(Fig 1: 224).

#### ***Claim Rejections - 35 USC § 103***

4. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

The factual inquiries set forth in *Graham v. John Deere Co.*, 383 U.S. 1, 148 USPQ 459 (1966), that are applied for establishing a background for determining obviousness under 35 U.S.C. 103(a) are summarized as follows:

1. Determining the scope and contents of the prior art.
2. Ascertaining the differences between the prior art and the claims at issue.
3. Resolving the level of ordinary skill in the pertinent art.
4. Considering objective evidence present in the application indicating obviousness or non-obviousness.

5. Claims 5, 9-13, 16, 21-24 are rejected under 35 U.S.C. 103(a) as being unpatentable over Ziari et al. (US 6404542).

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With respect to claim 5, the claim further require the wavelength of the lasers are approximately 1200~1600nm. Ziari '542 did not discretely disclose about the wavelength of the laser module. However, it has been held where the general conditions of a claim are disclosed in the prior art, discovering the optimum or workable ranges involves only routine skill in the art, in this case the structure of the semiconductor and its module. *In re Aller*, 105 USPQ 233.

With respect to claims 8, 9, 10 Ziari '542 shows in the (figure 5: 508) the polarization combining unit are formed so that the rays are mixed and propagate to the optical fiber, and the birefrin.

With respect to claims 11-13, 16, 21-24 (Col 3: 45-67) discloses the prism and elements mount on holder. It has been held that omission of an element and its function in a combination where the remaining elements perform the same function as before involves only routine skill in the art, in this case the optical elements mount on the same holder so that the lasers can accurately control. *In re Karlson*, 136 USPQ 184.

8. Claims 18-19 are rejected under 35 U.S.C. 103(a) as being unpatentable over Ziari et al. (US 6404542) in view of Ohshima et al. (US 5068865).

Ziari '542 discloses the above, the claims further require that the semiconductor mont on cooling device and fixing to bases. Ohshima et al. '865 discloses the use of cooling mounted platform to control the temperature of laser device coupling to the output fiber. It is within one skill in the art to provide Ziari '542 the peltier or cooling platform as suggested by Ohshima '865 to control the heat radiate from the semiconductor element.

***Allowable Subject Matter***

Claim 4 is objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims, since the prior art of record and considered pertinent to the applicant's disclosure does not teach or suggest the claimed ***a heat sink formed with diamond, where the first or second electrode is bonded to the diamond of the heat sink.***


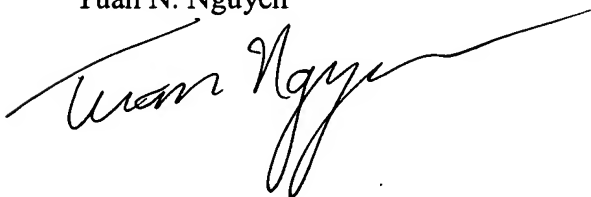
***Communication Information***

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Tuan N Nguyen whose telephone number is (571) 272-1948. The examiner can normally be reached on Mon-Fri.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Harvey Minsun can be reached on (703) 308-16741. The fax phone numbers for the organization where this application or proceeding is assigned are (703) 872-9306 for regular communications and (703) 872-9306 for After Final communications.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 306-3329.

Tuan N. Nguyen



HARVEY MINSUN OH HARVEY  
PRIMARY EXAMINER